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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/354,945	07/15/1999	AKIO KOSAKA	09952/029001	5787

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FISH & RICHARDSON, PC
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EXAMINER

CRAVER, CHARLES R

ART UNIT	PAPER NUMBER
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2682

DATE MAILED: 06/05/2003

17

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.
09/354,945

Applicant(s)
Kosaka

Examiner
Charles Craver

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136 (a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on Mar 18, 2003.
- 2a) ☒ This action is FINAL. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11; 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-16 is/are pending in the application.
- 4a) Of the above, claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-16 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claims _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☒ Acknowledgement is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☒ All b) ☐ Some* c) ☐ None of:
- ☒ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- *See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgement is made of a claim for domestic priority under 35 U.S.C. § 119(e).
a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgement is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892) 4) ☐ Interview Summary (PTO-413) Paper No(s). _____
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948) 5) ☐ Notice of Informal Patent Application (PTO-152)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s). _____ 6) ☐ Other:

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DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless --

(e) the invention was described in a patent granted on an application for patent by another filed in the United States before the invention thereof by the applicant for patent, or on an international application by another who has fulfilled the requirements of paragraphs (1), (2), and (4) of section 371© of this title before the invention thereof by the applicant for patent.

2. Claims 1, 5, 6, 8, 12, 13 and 16 are rejected under 35 U.S.C. 102(e) as being anticipated by Nakaya et al, of record.

Regarding claims 1 and 8,

Nakaya discloses a radio communication terminal (100) having a battery (127) comprising power detecting means (131) for detecting remaining battery power (col 4 lines 50-57), speed setting means (133, col 4 lines 57-61) for setting different data rates (reads radio communication rates) for which the terminal is able to communicate based on the remaining power (col 3 lines 11-25), the speed decreasing as the power decreases (col 3 lines 25-28, col 8 line 31-col 9 line 26), and

control means (110) for controlling data communications at said speeds (col 4 lines 55-61).

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Nakaya further discloses that the decreasing rate is done to lower power consumption (col 9 lines 18-26).

Regarding claims 5 and 12,

Nakaya discloses a radio communication terminal (100) having a battery (127) comprising image communicating means (112, 123, 125), power detecting means (131) for detecting remaining battery power (col 4 lines 50-57), means to change resolution based on the battery, and that the resolution is directly proportional to the battery charge (i.e. increases with charge, col 5 line 28-col 6 line 29)

speed setting means (133, col 4 lines 57-61) for setting different data rates (reads radio communication rates) for which the terminal is able to communicate based on the remaining power (col 3 lines 11-25), the speed decreasing as the power decreases (col 3 lines 25-28, col 8 line 31-col 9 line 26), and

control means (110) for controlling data communications at said speeds (col 4 lines 55-61).

Nakaya further discloses that the decreasing rate is done to lower power consumption (col 9 lines 18-26).

Regarding claim 6 and 13,

Nakaya further discloses

image communicating means (112, 123, 125),

display means (103) for displaying received images,

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means for inhibiting image transmission based on the remaining detected power, specifically, if detected power is below a threshold, after which the reception means may continue to receive (col 8 lines 30-66). In such a case, the latest received image would inherently be displayed at such a time.

Regarding claim 16,

Nakaya discloses a radio communication terminal (100) having a battery (127) comprising image communicating means (112, 123, 125), power detecting means (131) for detecting remaining battery power (col 4 lines 50-57), means to change resolution based on the battery, and that the resolution is directly proportional to the battery charge (i.e. increases with charge, col 5 line 28-col 6 line 29)

speed setting means (133, col 4 lines 57-61) for setting different data rates (reads radio communication rates) for which the terminal is able to communicate based on the remaining power (col 3 lines 11-25), the speed decreasing as the power decreases (col 3 lines 25-28, col 8 line 31-col 9 line 26), and

control means (110) for controlling data communications at said speeds (col 4 lines 55-61).

Nakaya further discloses that the decreasing rate is done to lower power consumption (col 9 lines 18-26).

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Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 2-4, 7, 9-11, 14 and 15 are rejected under 35 U.S.C. 103(a) as being unpatentable over Nakaya in view of Flynn, of record.

Regarding claims 2 and 9,

Nakaya discloses a radio communication terminal (100) having a battery (127) comprising power detecting means (131) for detecting remaining battery power (col 4 lines 50-57), speed setting means (133, col 4 lines 57-61) for setting different data rates (reads radio communication rates) for which the terminal is able to communicate based on the remaining power (col 3 lines 11-25, col 8 line 31-col 9 line 26), and

control means (110) for controlling data communications at said speeds (col 4 lines 55-61).

Nakaya does not disclose means for detecting an external power supply (charger).

Flynn discloses the utility of providing battery charging means to a portable device with battery power-level based control (col 7 lines 16-22, col 8 lines 13-30, col 10 lines 8-42), inherently comprising means to detect the presence of the charging means.

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Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to add a charger to Nakaya. This feature would alleviate the need to constantly replace batteries, saving the user money, and was notoriously well known to anyone of ordinary skill in the art as an obvious improvement in portable battery-powered communication devices. Such a charging step would thus increase the power in the battery, and increase the data rate accordingly, based on the teachings of Nakaya.

Regarding claims 3 and 10,

Nakaya further discloses image transmitting means (112), including means to change resolution based on the battery (and thus the charging, col 5 line 28-col 6 line 29).

Regarding claims 4 and 11,

Nakaya further discloses a display (103), and discloses the utility of darkening a display if the battery remaining power drops below a threshold (col 2 lines 7-15); as such, in the combined invention of Nakaya and Flynn, in the case the charger is plugged in and detected and power flows to the battery causing the remaining power to again surpass said threshold, the display would then be relit.

Regarding claims 7, 14 and 15,

Nakaya further discloses power detecting means (131) for detecting remaining battery power (col 4 lines 50-57). In such a case that the charging means of Flynn is not connected to the device, power would not be replenished, and as such the battery power level would decrease; thus, in such a case, the speed setting means would begin the process of decreasing the

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communication speed. In the case of claim 15, the charging would, as stated above in the rejection of claims 4 and 11, cause the device to raise the communications level once said threshold had been surpassed. Said method would inherently operate the same irrespective of the power supply used.

Nakaya further discloses that the decreasing rate is done to lower power consumption (col 9 lines 18-26).

Response to Arguments

5. Applicant's arguments filed 3-18-03 have been fully considered but they are not persuasive.

Regarding the amended language stating that the "radio transmission rate" is adjusted, the examiner continues to read such a teaching broadly. This is because a reading of the applicant's specification reveals that the intended rate to be adjusted based on the remaining battery power is indeed a data transmission rate, such as the rate change from 64 to 8 kbps stated on page 9 line 6-page 10 line 12 of the disclosure. Given that Nakaya teaches a changing frame rate, and the means to switch from image/audio to audio-only modes based on said battery (col 8 line 31-col 9 line 26), said rates are believed to inherently vary in communication rates in the same way as the instant invention, that is, that a high-quality image-audio signal will have a much higher rate in bps than an audio-only transmission. Note, for example, that Nakaya states that the frame rate may be lowered, see col 9 lines 18-37 and especially FIG 10. Nakaya teaches that the frame rate may be

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lowered from N frames/second to N/2 frames per second for encoding the data for transmission. This inherently lowers the data rate by half, which thus lowers the speed of the communication by half. While the applicant continues to read the limitation regarding communication speed very specifically, the examiner continues to read the changing communication rate as a changing communication speed, since the amount of data per unit of time may be lowered, which is by definition the speed of data communication. As suggested by the applicant, Nakaya is concerned about the amount of information, see AMDT C page 10 lines 18-21. Since the amount of information per unit time defines the communication speed, such is changed by Nakaya. Note last of all, that Nakaya discloses that the overall rate of calculation of the unit CPU may be lowered based on the remaining power (col 10 lines 33-67), in which case the output digital data stream rate would be lowered, and thus the communications rate as well. Regarding Flynn, the examiner upholds that the use of a charger would inherently cause the detection of the presence of said charger.

Conclusion

6. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO**

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MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

7. Any response to this action should be mailed to:

Commissioner of Patents and Trademarks

Washington, D.C. 20231

or faxed to:

(703) 872-9314, (for formal communications intended for entry)

Or:

(703) 872-9314 (for informal or draft communications, please label "PROPOSED" or "DRAFT")

Hand delivered responses should be brought to Crystal Park II, 2121 Crystal Drive, Arlington VA, sixth floor (receptionist).

8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Charles Craver whose telephone number is (703) 305-3965.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Vivian Chin, can be reached on (703) 308-6739.


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Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Group receptionist whose telephone number is (703) 305-4700.

cc

C. Craver
May 31, 2003


CHARLES CRAVER
PATENT EXAMINER


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